2 SUMMARY

2.1 INTRODUCTION

State Parks has prepared this tiered draft environmental impact report (DEIR) to provide agencies and the public with information about the potential environmental effects of the proposed Bidwell-Sacramento River State Park Habitat Restoration and Outdoor Recreation Facilities Development Project (proposed project or project). This DEIR has been prepared in accordance with the California Environmental Quality Act (CEQA) (Pub. Res. Code Section 21000 et seq.) and the State CEQA Guidelines (14 California Code of Regulations [CCR] Section 15000 et seq.). CEQA defines a "project" as any activity directly undertaken by a public agency that "may cause either a direct physical change in the environment, or a reasonably foreseeable indirect physical change in the environment" (Pub. Res. Code Section 21065).

This summary is provided in accordance with State CEQA Guidelines Section 15123. As stated in Section 15123(a), "an EIR shall contain a brief summary of the proposed actions and its consequences. The language of the summary should be as clear and simple as reasonably practical." Pursuant to the State CEQA Guidelines, this section includes: (1) a summary description of proposed project elements, (2) a synopsis of environmental impacts of the proposed project and recommended mitigation measures (in tabular form), (3) identification of the alternatives evaluated and of the environmentally superior alternative, and (4) a discussion of potential areas of controversy associated with the project.

2.2 SUMMARY OF PROPOSED PROJECT ELEMENTS

State Parks, with planning assistance from the Nature Conservancy (TNC), is proposing to implement the project on two parcels known as the Singh Unit and Nicolaus property (collectively known as the project site) along the Sacramento River within and adjacent to Bidwell-Sacramento River State Park (BSRSP or Park), west of the City of Chico in Butte County, California. The Singh Unit is owned by State Parks and located within BSRSP. The Nicolaus property is currently owned by TNC, but would be transferred to State Parks, as part of the proposed project, prior to implementation of habitat restoration activities and recreation facilities development. It is located immediately adjacent to the Indian Fisheries subunit of BSRSP. Both the Singh Unit and Nicolaus property are currently in agricultural production (walnut and/or almond orchards).

2.2.1 HABITAT RESTORATION

The first project objective is to restore natural topography and vegetation on the Singh Unit and Nicolaus property. This includes the removal of two human made berms on the Singh Unit; the removal of nonnative invasive vegetation, including eucalyptus on the Singh Unit adjacent to River Road; and, restoration of the following natural communities:

- cottonwood mixed riparian forest,
- valley oak savannah,
- mixed riparian forest,
- valley oak riparian forest, and
- native grasslands.

The Singh Unit and Nicolaus property present a unique opportunity for habitat restoration because they are located at the confluence of the Sacramento River, Big Chico Creek, and Mud Creek. The protection and restoration of habitat on these two parcels would aid in the recovery of special-status species, rehabilitate natural processes along the river, protect and restore riparian habitat, and improve water quality.

2.2.2 OUTDOOR RECREATION FACILITIES DEVELOPMENT

The second project objective includes the transfer of ownership of the Nicolaus property from TNC to State Parks and development of outdoor recreation facilities on both the Nicolaus property and the Singh Unit. The property would become part of BSRSP prior to implementation of habitat restoration activities or outdoor recreation facilities development. The inclusion of the Nicolaus property within BSRSP, and restoration of the Nicolaus property and the Singh Unit, would present an opportunity to enhance and expand the Park's recreational and public access opportunities. Therefore, the project would include the creation of new trails on both properties, aligned to connect with existing and proposed trails and facilities within the Park. It would also result in the construction of new day-use and overnight camping facilities on the Nicolaus property. The Park headquarters would be relocated to the existing farm complex on the Nicolaus property, which is on higher, less frequently flooded ground compared to the current headquarters location. By expanding outdoor recreation facilities and restoring habitat at BSRSP, this project would increase public accessibility to the middle reaches of the Sacramento River, while providing more habitat for riparian and river-dependent wildlife and plant species.

2.3 ENVIRONMENTAL IMPACTS AND RECOMMENDED MITIGATION MEASURES

Table 2-1, "Summary of Impacts and Mitigation Measures" (included at the end of this chapter), provides a summary of the environmental impacts of the proposed project, the level of significance of each impact before mitigation, recommended mitigation measures, and the level of significance of each impact after implementation of the mitigation. As shown in Table 2-1, implementation of the proposed project could result in potentially significant impacts to undocumented or undiscovered prehistoric or historic archaeological resources during project implementation phases. These potential impacts would be mitigated to less than significant levels with implementation of Mitigation Measures 4.5-a and 4.5-b. The proposed project would restore some land used for agriculture to native riparian habitat, effectively removing it from agricultural production; however, this process would be neither irreversible nor cause serious degradation or elimination of the physical or natural conditions that provide the land's values for farming. In addition, the proposed project would provide several environmental benefits: re-establishment of fully functioning riparian ecosystems would benefit sensitive habitats, special-status plants, and wildlife species; restoring natural riparian areas would benefit Sacramento River system fisheries by increasing complexity of the aquatic environment and providing cover, food, and other habitat components. Furthermore, the proposed project would re-establish long-term processes and functions present in natural riparian communities, including the natural formation of soils that gave these lands their original agricultural value. Fully functioning riparian ecosystems are also known to improve groundwater and surface water quality by removing undesirable constituents such as nutrients and pesticides.

2.4 SUMMARY OF ALTERNATIVES

Guiding principles for an analysis of alternatives are provided by the State CEQA Guidelines Section 15126.6. In accordance with the State CEQA Guidelines, this Draft EIR evaluates the following three alternatives:

- Proposed project
- No project
- Passive restoration

An EIR is required to identify the environmentally superior alternative from among the range of reasonable alternatives that are evaluated. State CEQA Guidelines Section 15126.6(d)(2) state that if the environmentally superior alternative is the no project alternative, the EIR shall also identify an environmentally superior alternative from among the other alternatives. Alternatives considered in this DEIR include the proposed project, the no project alternative, and the passive restoration alternative.

The no project alternative would not meet the project objectives to restore natural topography and vegetation or increase public access and outdoor recreation opportunities at BSRSP and would not provide the biological benefits that would be provided by the other two alternatives.

The proposed project is the environmentally superior alternative of the alternatives considered. Under the proposed project, native species would be planted and actively maintained for 3 years to allow the planted vegetation to become established. The planned maintenance program includes irrigation and weed control to allow root systems to mature to the depth of the water table and to eliminate or control weeds that could interfere with the establishment of native plants. The proposed project would provide the best balance between avoiding environmental impacts and achieving the project objectives. No significant increases in flood risks would result from any of the alternatives considered. Although some impacts associated with the proposed project would be avoided by the passive restoration alternative, those impacts would be reduced to a less-than-significant level under the proposed project with the incorporation of mitigation. In addition, the proposed project would provide greater benefits to biological and recreational resources than the no project or passive restoration alternatives.

2.5 AREAS OF CONTROVERSY

State Parks issued an NOP on August 28, 2007, to inform agencies and the public of the preparation of an EIR on the proposed project. The purpose of the NOP was to solicit comments from public agencies and interested members of the public on issues germane to the proposed project that should be considered in the Draft EIR. State Parks received nine written comments on the NOP. State Parks also held a scoping meeting for the public and agencies on September 19, 2007. Comments were presented by individuals at the public scoping meeting. Appendix A of this Draft EIR contains a copy of the NOP, scoping meeting notes, copies of written comments received, and a summary of how the scoping comments have been addressed in this DEIR.

Implementation of the proposed project would involve re-establishing native riparian habitat on agricultural lands. Whether restoration of riparian habitat on lands that have more recently been in agricultural uses would result in significant environmental impacts has been an issue for discussion by the affected public and state and federal agencies. This issue is discussed in detail in Section 4.2, “Agricultural Resources.” In addition, the effects of re-establishing riparian habitat on the direction and flow pattern of flood events has also been expressed as an issue of concern. This issue is discussed in detail in Section 4.3, “Hydrology, Water Quality, and River Geomorphology,” and in Appendix B, “Hydraulic Analysis,” which includes the *Flood Neutral Hydraulic Analysis for the Nicolaus and Singh Properties, Sacramento River RM 194–195*, December 2007.

Table 2-1
Summary of Impacts and Mitigation Measures

Impact	Level of Significance Before Mitigation	Mitigation Measure	Level of Significance After Mitigation
4.2 Agricultural Resources and Land Uses			
IMPACT 4.2-a. Change of Land Use from Agricultural Land to Restored Native Riparian Habitat and Developed Recreational Facilities. The proposed project would restore agricultural acreage to native riparian habitat and develop outdoor recreation facilities, effectively removing the land from agricultural production. However, the proposed project would neither be irreversible nor cause serious degradation or elimination of the physical or natural conditions that provide the site's values for farming. The proposed project would not stop or hinder the agricultural practices that occur on neighboring properties. This impact is considered less than significant.	LTS	No mitigation is required.	
IMPACT 4.2-b. Williamson Act Contract Cancellation and Land Use Compatibility. The Singh Unit is not in a Williamson Act contract. However, the Nicolaus property (approximately 146 acres) is currently in a Williamson Act contract. Transfer of ownership of the Nicolaus property from TNC to the State of California (i.e., State Parks) would not require a new Williamson Act contract (pursuant to California Government Code Section 51295). However, prior to the land transfer, State Parks is required to make findings pursuant to California Government Code Section 51292 to support the cancellation of the Williamson Act contract for the property. The cancellation would represent a 0.07% decrease in the total acreage under contract in Butte County (using data from 2005, which is the most recent data available). However, per California Government Code Section 51238.1, the proposed habitat restoration and outdoor recreational facilities would not significantly compromise the long-term agricultural capability of the Singh Unit and Nicolaus property. In addition, the habitat restoration and recreational facilities proposed are considered compatible with agriculture and therefore would have no significant adverse effects on neighboring farmland production. Therefore, this impact is considered less than significant.	LTS	No mitigation is required.	

B = Beneficial Impact LTS = Less-than-Significant Impact PS = Potentially Significant Impact

Table 2-1
Summary of Impacts and Mitigation Measures

Impact	Level of Significance Before Mitigation	Mitigation Measure	Level of Significance After Mitigation
4.3 Hydrology, Water Quality, and River Geomorphology			
IMPACT 4.3-a. Changes in Flood Hydrology. The proposed project would have the potential to change local and downstream flood hydrology on the Sacramento River by changing vegetation densities and land cover types on the floodplain. Modeling results predicted localized changes in flood stage elevations up to 0.10 foot. This small change does not represent an increase that would pose a significant risk to people, structures, or the operation of flood control infrastructure and does not violate existing regulations for risk to flood control infrastructure. Project-related changes in local and downstream flood hydrology would be less than significant.	LTS	No mitigation is required.	
IMPACT 4.3-b. Changes in Geomorphic Processes. Increasing vegetation densities (habitat restoration) and changing land cover types (recreation facility development) on the floodplain would alter water velocities in the existing floodway in the project area, possibly changing sediment transport, channel scouring, and meander migration. Any potential changes in velocities would be too small to substantially affect channel hydraulics or lead to erosive forces that could affect this already dynamic system. The changes in geomorphic processes resulting from restoration activities would be less than significant.	LTS	No mitigation is required.	
IMPACT 4.3-c. Temporary Effects on Water Quality Associated with Proposed Project Implementation. Implementation of the project would be accomplished through the use of standard agricultural practices (already being used throughout the project area) and construction activities. Restoration activities would include orchard removal, discing, seeding, planting, and temporary herbicide use. Irrigation system modification and expansion would include standard trench and backfill techniques. Development of recreational facilities would include grading and compaction of park roads and parking spaces, and the installation of park trails, buildings, shelters, and restroom facilities. Utilization of standard agricultural practices for restoration implementation would not be expected to cause soil erosion and/or sedimentation of local drainages or the Sacramento River channel. However, potential temporary effects on water quality associated with the construction of recreational facilities could be potentially significant.	PS	**Mitigation Measure 4.3-a:** Acquire Appropriate Regulatory Permits and Implement SWPPP and BMPs.	LTS

B = Beneficial Impact LTS = Less-than-Significant Impact PS = Potentially Significant Impact

Table 2-1
Summary of Impacts and Mitigation Measures

Impact	Level of Significance Before Mitigation	Mitigation Measure	Level of Significance After Mitigation
IMPACT 4.3-d. Long-Term Effects on Water Quality and Water Temperature in the Sacramento River. Replacing flood-prone agriculture with restored riparian habitat would decrease pesticide and herbicide applications on land adjacent to the river, thereby increasing water quality. Additionally, restored riparian forests would buffer and filter toxic and organic matter that originate further away from the river, thereby further enhancing water quality. Restoring native riparian habitat would have no discernible effect on water temperature, and may actually have a moderating effect on water temperature over the long-term. The development of recreational facilities would involve the conversion of orchards to roads, campgrounds, trails, and other facilities; which would increase human uses and potentially result in the degradation of runoff water quality from the project site. However, human uses of these areas would generally be low-intensity and facilities would be managed to minimize potential water quality effects. This impact would be less than significant.	LTS	No mitigation is required.	
IMPACT 4.3-e. Change in Water Demand and Available Water Supply. Over the long term, the proposed project would result in a decrease in the use of groundwater. The conversion of orchards to native vegetation would require less water for irrigation; especially after planted vegetation has become established. Certain wells would remain in-use to provide water for recreational facilities; however, there would be an expected net decrease in water demand/use compared to existing conditions. This decrease in water demand is considered a beneficial effect.	B	No mitigation is required.	
4.4 Biological Resources			
IMPACT 4.4-a. Change in Habitat Conditions. Implementation of the proposed project would involve restoration of native Sacramento River riparian habitat on land that has been actively cultivated. It would not result in the loss or disturbance of native habitats or special-status plant species because these resources are not present in areas that would be disturbed during restoration activities. Restoration of native habitat would, in fact, have a long-term beneficial effect to native vegetation and associated plant species.	B	No mitigation is required.	

B = Beneficial Impact LTS = Less-than-Significant Impact PS = Potentially Significant Impact

Table 2-1
Summary of Impacts and Mitigation Measures

Impact	Level of Significance Before Mitigation	Mitigation Measure	Level of Significance After Mitigation
IMPACT 4.4-b. Introduction and Spread of Invasive Plants (Weeds). Implementation of the proposed project would involve initial ground clearing and an eventual reduction in the active management and control of nonnative invasive plants from the present level associated with agricultural activities on the project site. The restoration plans for both the Singh Unit and the Nicolaus property have specific measures for the control of nonnative invasive plant species. Therefore, the potential for project implementation to increase the risk of spreading nonnative invasive plant species into adjacent existing native habitats is low. The potential introduction and spread of nonnative invasive plants would be a less-than-significant impact.	LTS	No mitigation is required.	
IMPACT 4.4-c. Potential Effects to Wildlife. Implementation of the proposed project would result in an overall benefit to wildlife. Approximately 150 acres would be restored from cultivated orchard to native riparian habitat, which supports a greater diversity and abundance of wildlife, including many special-status species.	B	No mitigation is required.	
IMPACT 4.4-d. Potential Effects to Valley Elderberry Longhorn Beetles. No elderberry shrubs would be directly affected by habitat restoration activities or recreation facilities construction, because these activities would be restricted to areas that have long been subject to high levels of disturbance from agricultural activities and do not support any elderberry shrubs. In addition, the restoration plans do not include planting elderberry shrubs. However, elderberry shrubs that could support valley elderberry longhorn beetle are likely to occur adjacent to the project site. Therefore, focused surveys for elderberry shrubs would be conducted on land within 100 feet of the project site prior to construction. If any elderberry shrubs with 1.0 inch or greater stem diameter are found, USFWS conservation guidelines for valley elderberry longhorn beetles would be followed. Therefore, the proposed project would result in a less than significant impact to valley elderberry longhorn beetles.	LTS	No mitigation is required.	

B = Beneficial Impact LTS = Less-than-Significant Impact PS = Potentially Significant Impact

Table 2-1
Summary of Impacts and Mitigation Measures

Impact	Level of Significance Before Mitigation	Mitigation Measure	Level of Significance After Mitigation
IMPACT 4.4-e. Implementation of the proposed project could result in a potentially significant construction-related loss and/or disturbance of birds and bats nesting or roosting in or near the project site.	PS	**Mitigation Measure 4.4-e:** Avoidance of Disturbance to Nesting Migratory Birds and Roosting Bats. **Mitigation Measure 4.4-e:** Avoidance of Disturbance to Nesting Raptors and Special-status Birds.	B
IMPACT 4.4-f. Potential Effects to Fisheries. Implementation of the proposed project would not result in loss or disturbance of fish habitat or special-status fish because these resources are not present in areas that would be disturbed during restoration activities. The creation of recreational facilities would involve construction activities and increased visitation of the project area; however, this potential impact would be minimized with implementation of a storm water pollution prevention plan and therefore would not result in significant impacts to the Sacramento River fisheries. Restoration of riparian habitat would be expected to have a long-term beneficial effect to fish.	B	No mitigation is required.	
4.5 Cultural Resources			
IMPACT 4.5-a. Potential Disturbances to Undocumented Cultural Resources. Implementation of the project, including site preparation, planting, and recreation facilities development, may affect currently undiscovered or unrecorded archaeological sites. The possibility of disturbing unrecorded resources is considered a potentially significant impact.	PS	**Mitigation Measure 4.5-a:** If unrecorded cultural resources are encountered during project-related ground-disturbing activities, a qualified cultural resources specialist shall be contacted to assess the potential significance of the find.	LTS
IMPACT 4.5-b. Potential Disturbances to Undocumented Human Remains. Currently undiscovered human remains may be uncovered during proposed project activities. The possibility of disturbing human remains is considered a potentially significant impact.	PS	**Mitigation Measure 4.5-b:** Stop potentially damaging work if human remains are uncovered during project-related ground-disturbing activities, assess the significance of the find, and pursue appropriate management.	LTS

B = Beneficial Impact LTS = Less-than-Significant Impact PS = Potentially Significant Impact

Table 2-1
Summary of Impacts and Mitigation Measures

Impact	Level of Significance Before Mitigation	Mitigation Measure	Level of Significance After Mitigation
4.6. Air Quality and Climate Change			
IMPACT 4.6-a. Generation of Short-Term Restoration- and Construction-Related Emissions of Criteria Air Pollutants and Precursors. Project-generated, restoration-related emissions levels of criteria air pollutants and precursors would not be substantially different from those currently generated by existing on-site orchard operations. However, emissions of ROG and PM_{10} associated with the construction of the campground and new park headquarters would exceed associated BCAQMD trigger levels for incorporating applicable recommended emission reduction measures. Because applicable BCAQMD-recommended mitigation measures are not currently incorporated into the project description, this impact would be significant.	S	**Mitigation Measure 4.6-a:** Implement Measures to Reduce Short-Term Restoration- and Construction Emissions of ROG, NO_X, and PM_{10}	LTS
IMPACT 4.6-b. Generation of Long-Term Operation-Related (Regional) Emissions of Criteria Air Pollutants and Precursor Emissions. Operation of the proposed campgrounds, relocated headquarters, and new day-use facilities would result in project-generated emissions of PM_{10} that exceed BCAQMD's "Level B" trigger level of 80 lb/day and emissions of ROG that exceed BCAQMD's "Level C" action-level threshold of 137 lb/day (refer to Table 4.6-5). Thus, project-generated, operation-related emissions of criteria air pollutants and precursors could violate or contribute substantially to an existing or projected air quality violation, and/or expose sensitive receptors to substantial pollutant concentrations, especially considering the nonattainment status of Butte County. In addition, project-generated emissions could also conflict with air quality planning efforts. As a result, this would be a significant impact.	S	**Mitigation Measure 4.6-b.** Prohibit campfires during burn bans established by Cal-Fire and/or BCAQMD's "Don't Light Tonight" Advisory Program.	LTS
IMPACT 4.6-c. Local Mobile-Source Carbon Monoxide Emissions. The proposed project would not result in, or contribute to, congestion on nearby roadways or at nearby intersections and, as such, would not result in or contribute to CO concentrations that exceed the California 1-hour CO ambient air quality standard of 20 parts per million (ppm) or the 8-hour CO ambient air quality standard of 9 ppm. As a result, this would be considered a less-than-significant impact.	LTS	No mitigation is required.	

Table 2-1
Summary of Impacts and Mitigation Measures

Impact	Level of Significance Before Mitigation	Mitigation Measure	Level of Significance After Mitigation
IMPACT 4.6-d. Odor Emissions. Odorous diesel exhaust emissions from on-site construction and restoration equipment would be temporary and intermittent in nature and dissipate rapidly from the source. Also, the proposed project would not include the long-term operation of an odorous emission source. Odorous emissions may occur when the RV dump station is serviced (i.e., biosolids removed); however, pumping of the RV dump station would be performed on an infrequent basis and the dump station would not be located in close proximity to off-site sensitive receptors. Thus, the project would not create objectionable odors affecting a substantial number of people. This impact would be less than significant.	LTS	No mitigation is required.	
IMPACT 4.6-e. Toxic Air Contaminant Emissions. The proposed project would not be a source of toxic air contaminant emissions (TACs), and there are no sources of TAC emissions near the project site; therefore, the project would not result in the exposure of sensitive receptors to TAC emissions that exceed recommended thresholds. This would be considered a less-than-significant impact.	LTS	No mitigation is required.	
IMPACT 4.6-f. Greenhouse Gas Emissions. While the project could potentially result in a net increase or decrease in GHG emissions, the size of the change would be considered nominal. Nonetheless, if the project contributed a net increase in GHG emissions, the amount would be less than considerable. This impact would be less than significant.	LTS	No mitigation is required.	
5. Cumulative Impacts			
Agricultural Resources–no cumulatively significant impacts	LTS	No mitigation is required.	
Hydrology, Water Quality, and River Geomorphology–no cumulatively significant impacts	LTS	No mitigation is required.	
Biological Resources–cumulative effects would be beneficial	B	No mitigation is required.	
Cultural Resources–no cumulatively significant impacts	LTS	No mitigation is required.	

B = Beneficial Impact LTS = Less-than-Significant Impact PS = Potentially Significant Impact